

# United States Patent and Trademark Office

UNITED STATES DEPARTMENT OF COMMERCE United States Patent and Trademark Office Address: COMMISSIONER FOR PATENTS P.O. Box 1450 Alexandria, Virginia 22313-1450 www.uspto.gov

Γ	APPLICATION NO.	FILING DATE	FIRST NAMED INVENTOR	ATTORNEY DOCKET NO.	CONFIRMATION NO.
	10/726,806	12/03/2003	Benjamin F. James IV	IND-38DIV	4108
	27777 7	27777 7590 08/24/2005		EXAMINER	
	PHILIP S. JO JOHNSON & J			BLEVINS, JERRY M	
		N & JOHNSON PLAZ	A	ART UNIT	PAPER NUMBER
	NEW BRUNS	WICK, NJ 08933-700	3	2883	

DATE MAILED: 08/24/2005

Please find below and/or attached an Office communication concerning this application or proceeding.

\$
"

	Application No.	Applicant(s)				
	10/726,806	JAMES ET AL.				
Office Action Summary	Examiner	Art Unit				
	Jerry Martin Blevins	2883				
- The MAILING DATE of this communication app Period for Reply	pears on the cover sheet with the c	orrespondence address				
A SHORTENED STATUTORY PERIOD FOR REPL' THE MAILING DATE OF THIS COMMUNICATION.  - Extensions of time may be available under the provisions of 37 CFR 1.1 after SIX (6) MONTHS from the mailing date of this communication.  - If the period for reply specified above is less than thirty (30) days, a reply If NO period for reply is specified above, the maximum statutory period or  - Failure to reply within the set or extended period for reply will, by statute Any reply received by the Office later than three months after the mailing earned patent term adjustment. See 37 CFR 1.704(b).	36(a). In no event, however, may a reply be time within the statutory minimum of thirty (30) days will apply and will expire SIX (6) MONTHS from a cause the application to become ABANDONE	nely filed s will be considered timely. the mailing date of this communication. D (35 U.S.C. § 133).				
Status						
1) Responsive to communication(s) filed on 26 A	<u>oril 2005</u> .	·				
2a) ☐ This action is <b>FINAL</b> . 2b) ☑ This	action is non-final.					
3) Since this application is in condition for allowance except for formal matters, prosecution as to the merits is						
closed in accordance with the practice under Ex parte Quayle, 1935 C.D. 11, 453 O.G. 213.						
Disposition of Claims						
4) ☑ Claim(s) 15-24 and 26-30 is/are pending in the application. 4a) Of the above claim(s) is/are withdrawn from consideration.  5) ☐ Claim(s) is/are allowed.						
6)⊠ Claim(s) <u>15-24 and 26-30</u> is/are rejected.						
7) Claim(s) is/are objected to.						
8) Claim(s) are subject to restriction and/o	r election requirement.					
Application Papers						
9) ☐ The specification is objected to by the Examine 10) ☑ The drawing(s) filed on <u>03 December 2003</u> is/a Applicant may not request that any objection to the Replacement drawing sheet(s) including the correct	re: a)⊠ accepted or b)⊡ objector drawing(s) be held in abeyance. See ion is required if the drawing(s) is obj	e 37 CFR 1.85(a). ected to. See 37 CFR 1.121(d).				
11)☐ The oath or declaration is objected to by the Ex	raminer. Note the attached Office	Action or form PTO-152.				
Priority under 35 U.S.C. § 119						
<ul> <li>12) Acknowledgment is made of a claim for foreign a) All b) Some * c) None of:</li> <li>1. Certified copies of the priority document</li> <li>2. Certified copies of the priority document</li> <li>3. Copies of the certified copies of the priority application from the International Bureau</li> <li>* See the attached detailed Office action for a list</li> </ul>	s have been received. s have been received in Application rity documents have been receive u (PCT Rule 17.2(a)).	on No ed in this National Stage				
Attachment(s)						
1) Notice of References Cited (PTO-892)	4) Interview Summary					
Notice of Draftsperson's Patent Drawing Review (PTO-948)     Information Disclosure Statement(s) (PTO-1449 or PTO/SB/08)     Paper No(s)/Mail Date	Paper No(s)/Mail Da 5) Notice of Informal P 6) Other:	atent Application (PTO-152)				

#### **DETAILED ACTION**

### Response to Arguments

Applicant's arguments filed 05/15/2005 have been fully considered but they are not persuasive.

With regards to applicant's arguments with respect to 102 rejections of claims 15,16, and 30, examiner points out that US Patent to Dalton, sited in previous action, teaches an association of the proximal end of the fiber cores with an optical connector, particularly in column 9 line 55 – column 10, line 9. Dalton also teaches an optical fiber core in a continuous, uninterrupted sleeve, as demonstrated in Figure 1. Given that Dalton explicitly teaches that the sleeve extends at least from the proximal end to the distal face of the optical fiber core, Figure 1, and the association of the proximal end of the fiber cores with an optical connector, examiner concludes that Dalton impliedly teaches that the sleeve extends from the connector (connected at the proximal end) to at least the distal end of the core.

With regards to applicant's arguments with respect to 103 rejections of claims 24 and 29, examiner points out that US Patent to Thielen, sited in previous action, also teaches forming a closed tissue penetrating tip, as particularly seen in the abstract and Figure 1.

Application/Control Number: 10/726,806

Art Unit: 2883

## Claim Rejections - 35 USC § 102

The following is a quotation of the appropriate paragraphs of 35 U.S.C. 102 that form the basis for the rejections under this section made in this Office action:

A person shall be entitled to a patent unless -

(e) the invention was described in (1) an application for patent, published under section 122(b), by another filed in the United States before the invention by the applicant for patent or (2) a patent granted on an application for patent by another filed in the United States before the invention by the applicant for patent, except that an international application filed under the treaty defined in section 351(a) shall have the effects for purposes of this subsection of an application filed in the United States only if the international application designated the United States and was published under Article 21(2) of such treaty in the English language.

Claims 15-21, 23, and 30 are rejected under 35 U.S.C. 102(e) as being anticipated by Dalton.

Regarding claims 15, 16, and 30, Dalton discloses a method of forming a medical device comprising the steps of: providing an optical fiber core having a proximal end and a distal face; associating the proximal end of the core with an optical connector; enclosing the fiber core in a continuous light transmitting sleeve by extending the sleeve distally of the distal face of the optical fiber core, wherein the sleeve has a length at least substantially the length of the optical fiber core extending from the optical connector to at least the distal face of the optical fiber core (Figure 1, column 8, lines 28-38 and column 9, lines 61-67).

Regarding claims 17-19, Dalton also teaches forming a tip in the sleeve, the tip being disposed distal of the distal face of the optical fiber core (column 13, line 7 – column 14, line 18), wherein a space is provided intermediate the distal face of the optical fiber core and the sleeve tip (Figures 3a, 3b).

Art Unit: 2883

Regarding claims 20 and 21, Dalton also teaches disposing a light scattering component in the space provided intermediate the distal face of the optical fiber core and the sleeve tip (Figure 1 and column 10, lines 10-25).

Regarding claim 23, Dalton also teaches that the step of enclosing the optical fiber core in the sleeve results in the sleeve touching the core (Figures 4 and 5).

### Claim Rejections - 35 USC § 103

The text of those sections of Title 35, U.S. Code not included in this action can be found in a prior Office action.

Claim 22 is rejected under 35 U.S.C. 103(a) as being unpatentable over Dalton.

Regarding claim 22, Dalton as discussed above discloses the method of making a device. Dalton, however, does not disclose that the method includes the step of abrading a portion of the inner surface of the sleeve. As disclosed in page 2 of the specification of the present application, it is known to abrade the sleeve in order to conduct light from an optical coupling layer to the exterior. It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Dalton to include the step of abrading a portion of the inner surface of the sleeve. The motivation would have been to improve conduction of light from the optical coupling layer to the exterior.

Claims 24, 26, and 29 are rejected under 35 U.S.C. 103(a) as being unpatentable over Thielen.

Regarding claim 24, Thielen discloses a method of making a device comprising the steps of: exposing a distal portion of an optical fiber; providing an optical coupling

layer intermediate the distal portion of the optical fiber core and the sleeve; and forming a closed, tissue penetrating tip disposed distal of the distal portion of the fiber core (abstract, column 2, lines 43-45 and 64-66, column 3, lines 25-27, and Figure 1).

Regarding claim 26, Thielen further teaches providing a space intermediate the distal face of the optical fiber core and the tissue penetrating tip (Figure 1).

Regarding claim 29, Thielen as discussed above discloses the method of making a device. Thielen, however, does not disclose that the method includes the step of abrading a portion of the inner surface of the sleeve. As disclosed in page 2 of the specification of the present application, it is known to abrade the sleeve in order to conduct light from an optical coupling layer to the exterior. It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Thielen to include the step of abrading a portion of the inner surface of the sleeve. The motivation would have been to improve conduction of light from the optical coupling layer to the exterior.

Claim 27 is rejected under 35 U.S.C. 103(a) as being unpatentable over Thielen in view of US Patent to Ohtsu et al., number 5,908,562.

Regarding claim 27, Thielen teaches the limitations of the base claim 24. Thielen does not teach disposing a material having fluorescent properties intermediate the distal face of the optical fiber core and the tip. Ohtsu teaches disposing a material having fluorescent properties intermediate a distal face of an optical fiber core and a tip (column 2, lines 17-30). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Thielen to include the teaching of Ohtsu. The

Application/Control Number: 10/726,806

Art Unit: 2883

motivation would have been to improve detection of the penetrated tissue (Ohtsu, column 2, lines 31-43).

Claim 28 is rejected under 35 U.S.C. 103(a) as being unpatentable over Thielen in view of Dalton.

Regarding claim 28, Thielen teaches the limitations of the base claim 24. Thielen does not teach contacting the fiber optic core with the sleeve. Dalton teaches contacting a fiber optic core with a sleeve (Figures 4 and 5). It would have been obvious to one of ordinary skill in the art at the time of the invention to modify Thielen to include the teaching of Dalton. The motivation would have been to improve protection of the core.

## **Double Patenting**

The nonstatutory double patenting rejection is based on a judicially created doctrine grounded in public policy (a policy reflected in the statute) so as to prevent the unjustified or improper timewise extension of the "right to exclude" granted by a patent and to prevent possible harassment by multiple assignees. See *In re Goodman*, 11 F.3d 1046, 29 USPQ2d 2010 (Fed. Cir. 1993); *In re Longi*, 759 F.2d 887, 225 USPQ 645 (Fed. Cir. 1985); *In re Van Ornum*, 686 F.2d 937, 214 USPQ 761 (CCPA 1982); *In re Vogel*, 422 F.2d 438, 164 USPQ 619 (CCPA 1970);and, *In re Thorington*, 418 F.2d 528, 163 USPQ 644 (CCPA 1969).

A timely filed terminal disclaimer in compliance with 37 CFR 1.321(c) may be used to overcome an actual or provisional rejection based on a nonstatutory double patenting ground provided the conflicting application or patent is shown to be commonly owned with this application. See 37 CFR 1.130(b).

Effective January 1, 1994, a registered attorney or agent of record may sign a terminal disclaimer. A terminal disclaimer signed by the assignee must fully comply with 37 CFR 3.73(b).

Claims 15-24, 26-30 are rejected under the judicially created doctrine of obviousness-type double patenting as being unpatentable over claims 1-4, 6-9 of U.S.

Patent No. 6,522,806. Although the conflicting claims are not identical, they are not patentably distinct from each other because claims 15-21, 23, 24, 26-28, and 30 merely recite the structure recited in claims 1-4 and 6-9 of U.S. Patent No. 6,522,806. For example, claim 15 of the present application and claim 1 of U.S. Patent No. 6,522,806 disclose a medical device comprising: an optical fiber core having a proximal end associated with an optical connector and a distal face, and a continuous, uninterrupted sleeve having a length at least substantially the length of the optical fiber core extending from the optical connector to at least the distal face of the optical fiber core. Furthermore, claims 22 and 29 of the present application and claim 4 of U.S. Patent No. 6,522,806 each teach a step of abrading a portion of an inner surface of the sleeve.

#### Conclusion

Any inquiry concerning this communication or earlier communications from the examiner should be directed to Jerry Martin Blevins whose telephone number is 571-272-8581. The examiner can normally be reached on Monday through Friday.

If attempts to reach the examiner by telephone are unsuccessful, the examiner's supervisor, Frank G. Font can be reached on 571-272-2415. The fax phone number for the organization where this application or proceeding is assigned is 703-872-9306.

Application/Control Number: 10/726,806

Art Unit: 2883

Page 8

Information regarding the status of an application may be obtained from the Patent Application Information Retrieval (PAIR) system. Status information for published applications may be obtained from either Private PAIR or Public PAIR. Status information for unpublished applications is available through Private PAIR only. For more information about the PAIR system, see http://pair-direct.uspto.gov. Should you have questions on access to the Private PAIR system, contact the Electronic Business Center (EBC) at 866-217-9197 (toll-free).

**JMB** 

Frank G. Font
Supervisory Patent Examiner
Technology Conter 2800

Frank & Fort